

DAMAGE SURVEY REPORT (DSR)
Emergency Watershed Protection Program – Recovery

Section 1A

Date of Report: 10/25/05

DSR Number: 019-05-017 R

Project Number: Contraband Bayou (L13/W20)

NRCS Entry Only

Eligible: YES ☐ NO ☐

Approved: YES ☐ NO ☐

Funding Priority Number (from Section 4)

Limited Resource Area: YES ☐ NO ☐

Section 1B Sponsor Information

Sponsor Name: Gravity Drainage Board GDD 4 W 3 in Lake Charles

Address: 1204 Lakeshore Drive

City/State/Zip: Lake Charles, La 70601

Telephone Number: 337-433-1160

Fax: 433-7661

Section 1C Site Location Information

County: Calcasieu Parish

State: LA

Congressional District: 07

Latitude: Start: N 30.18217 End: N30.18015

Longitude: Start: W 93.21867 End: W 93.22183

Section: 19, Township: 10 S. Range: 8 W.

UTM Coordinates:

Drainage Name: Contraband Bayou (L-13/W-20) Reach: Ryan Street to W-20 Confluence

Damage Description: Trees, branches and other debris in channel causing blockage and increased flooding to homes

Section 1D Site Evaluation

All answers in this Section must be YES in order to be eligible for EWP assistance.

Site Eligibility	YES	NO	Remarks
Damage was a result of a natural disaster?*	X		Hurricane Rita wind and storm damage
Recovery measures would be for runoff retardation or soil erosion prevention?*	X		Reduce upstream flooding, streambank erosion, and scour erosion
Threat to life and/or property?*	X		Reduce flooding upstream of channel blockage where homes and school is located
Event caused a sudden impairment in the watershed?*	X		Hurricane deposited debris in channel that will likely cause flooding after next major rainfall event
Imminent threat was created by this event?**	X		Flood damage to homes and school likely after next major rainfall event.
For structural repairs, not repaired twice within ten years?**	X		No evidence of repairs to pipes culverts or roads in past several years
Site Defensibility			
Economic, environmental, and social documentation adequate to warrant action? (Go to pages 3, 4, 5 and 6 ***)	X		See attached documentation
Proposed action technically viable? (Go to Page 9 ***)	X		See attached documentation

Have all the appropriate steps been taken to ensure that all segments of the affected population have been informed of the EWP program and its possible effects? YES X NO ☐

Comments: Local Gravity Drainage Board has been notified

* Statutory

** Regulation

*** DSR Pages 3 through 6 and 9 are required to support the decisions recorded on this summary page. If additional space is needed on this or any other page in this form, add appropriate pages. 1 of 14

Approved 7/2005

DSR NO: _____

Section 1E Proposed Action

Describe the preferred alternative from Findings: Section 5 A:

Total installation cost identified in this DSR: Section 3: \$ _____

Section 1F NRCS State Office Review and Approval

Reviewed By: _____ Date Reviewed: _____
State EWP Program Manager

Approved By: _____ Date Approved: _____
State Conservationist

PRIVACY ACT AND PUBLIC BURDEN STATEMENT

NOTE: The following statement is made in accordance with the Privacy Act of 1974, (5 U.S.C. 552a) and the Paperwork Reduction Act of 1995, as amended. The authority for requesting the following information is 7 CFR 624 (EWP) and Section 216 of the Flood Control Act of 1950, Public Law 81-516, 33 U.S.C. 701b-1; and Section 403 of the Agricultural Credit Act of 1978, Public Law 95334, as amended by Section 382, of the Federal Agriculture Improvement and Reform Act of 1996, Public Law 104-127, 16 U.S.C. 2203. EWP, through local sponsors, provides emergency measures for runoff retardation and erosion control to areas where a sudden impairment of a watershed threatens life or property. The Secretary of Agriculture has delegated the administration of EWP to the Chief or NRCS on state, tribal and private lands.

Signing this form indicates the sponsor concurs and agrees to provide the regional cost-share to implement the EWP recovery measure(s) determined eligible by NRCS under the terms and conditions of the program authority. Failure to provide a signature will result in the applicant being unable to apply for or receive a grant the applicable program authorities. Once signed by the sponsor, this information may not be provided to other agencies. IRS, Department of Justice, or other State or Federal Law Enforcement agencies, and in response to a court or administrative tribunal.

The provisions of criminal and civil fraud statutes, including 18 U.S.C. 286, 287, 371, 641, 651, 1001; 15 U.S.C. 714m; and 31 U.S.C. 3729 may also be applicable to the information provided. According to the Paperwork Reduction Act of 1995, an agency may not conduct or sponsor, and a person is not required to respond to a collection of information unless it displays a valid OMB control number. The valid OMB control number for this information collection is 0578-0030. The time required to complete this information collection is estimated to average 117/1.96 minutes/hours per response, including the time for reviewing instructions, searching existing data sources, field reviews, gathering, designing, and maintaining the data needed, and completing and reviewing the collection information.

USDA NONDISCRIMINATION STATEMENT

"The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, age, disability, and where applicable, sex, marital status, familial status, parental status, religion, sexual orientation, genetic information, political beliefs, reprisal, or because all or part of an individual's income is derived from any public assistance program. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille, large print, audiotope, etc.) should contact USDA's TARGET Center at (202)720-2600 (voice and TDD). To file a complaint of discrimination, write to USDA, Director, Office of Civil Rights, 1400 Independence Avenue, SW., Washington, DC 20250-9410, or call (800)795-3272 (voice) or (202) 720-6382 (TDD). USDA is an equal opportunity provider and employer.

Civil Rights Statement of Assurance

The program or activities conducted under this agreement will be in compliance with the nondiscrimination provisions contained in the Titles VI and VII of the Civil Rights Act of 1964, as amended; the Civil Rights Restoration Act of 1987 (Public Law 100-259); and other nondiscrimination statutes: namely, Section 504 of the Rehabilitation Act of 1973, Title IX of the Amendments of 1972, the Age Discrimination Act of 1975, and the Americans with Disabilities Act of 1990. They will also be in accordance with regulations of the Secretary of Agriculture (7 CFR 15, 15a, and 15b), which provide that no person in the United States shall on the grounds of race, color, national origin, gender, religion, age or disability, be excluded from participation in, be denied the benefits of, or otherwise subjected to discrimination under any program or activity receiving Federal financial assistance from the U.S. Department of Agriculture or any agency thereof.

Section 2 Environmental Evaluation

2A Resource Concerns	2B Existing Condition	2C Alternative Designation			
		Proposed Action	No Action	Alternative	
		2D Effects of Alternatives			
Soil					
Water					
Downstream water rights					
Air					
Plant					
Animal					
Other					

DSR NO: _____

Section 2E Special Environmental Concerns

Resource Consideration	Existing Condition	Alternatives and Effects		
		Proposed Action	No Action	Alternative
Clean Water Act Waters of the U.S.				
Coastal Zone Management Areas				
Coral Reefs				
Cultural Resources				
Endangered and Threatened Species				
Environmental Justice				
Essential Fish Habitat				
Fish and Wildlife Coordination				
Floodplain Management				
Invasive Species				
Migratory Birds				
Natural Areas				
Prime and Unique Farmlands				
Riparian Areas				
Scenic Beauty				
Wetlands				
Wild and Scenic Rivers				

Completed By: _____

Date: _____

DSR NO: _____

Section 2F Economic

This section must be completed by each alternative considered (attach additional sheets as necessary).

	Future Damages (\$)	Damage Factor (%)	Near Term Damage Reduction
Properties Protected (Private)			
Properties Protected (Public)			
Business Losses			
Other			
Total Near Term Damage Reduction \$			
Net Benefit (Total Near Term Damage Reduction minus Cost from Section 3)			

Completed By: _____ Date: _____

Section 2G Social Consideration This section must be completed by each alternative considered

(attach additional sheets as necessary).

	YES	NO	Remarks
Has there been a loss of life as a result of the watershed impairment?			
Is there the potential for loss of life due to damages from the watershed impairment?			
Has access to a hospital or medical facility been impaired by watershed impairment?			
Has the community as a whole been adversely impacted by the watershed impairment (life and property ceases to operate in a normal capacity)			
Is there a lack or has there been a reduction of public safety due to watershed impairment?			

Completed By: _____ Date: _____

DSR NO: _____

Section 2H Group Representation and Disability Information

This section is completed only for the preferred alternative selected.

Group Representation	Number
American Indian/Alaska Native Female Hispanic	
American Indian/Alaska Native Female Non-Hispanic	
American Indian/Alaska Native Male Hispanic	
American Indian/Alaska Native Male Non-Hispanic	
Asian Female Hispanic	
Asian Female Non-Hispanic	
Asian Male Hispanic	
Asian Male Non-Hispanic	
Black or African American Female Hispanic	
Black or African American Female Non-Hispanic	
Black or African American Male Hispanic	
Black or African American Male Non-Hispanic	
Hawaiian Native/Pacific Islander Female Hispanic	
Hawaiian Native/Pacific Islander Female Non-Hispanic	
Hawaiian Native/Pacific Islander Male Hispanic	
Hawaiian Native/Pacific Islander Male Non-Hispanic	
White Female Hispanic	
White Female Non-Hispanic	
White Male Hispanic	
White Male Non-Hispanic	
Total Group	

Census tract(s) _____

Completed By: _____ Date: _____

DSR NO: _____

Section 2I. Required consultation or coordination between the lead agency and/or the RFO and another governmental unit including tribes:

Easements, permissions, or permits:

Mitigation Description:

Agencies, persons, and references consulted, or to be consulted:

DSR NO: _____

Section 3 Engineering Cost Estimate

Completed By: _____ Date: _____

This section must be completed by each alternative considered (attach additional sheets as necessary).

Proposed Recovery Measure (including mitigation)	Quantity	Units	Unit Cost (\$)	Amount (\$)
Total Installation Cost (Enter in Section 1F)\$				

Unit Abbreviations:

AC	Acre	LS	Lump Sum
CY	Cubic Yard	SF	Square Feet
EA	Each	SY	Square Yard
HR	Hour	TN	Ton
LF	Linear Feet		Other (Specify)

DSR NO: _____

Section 4 NRCS EWP Funding Priority

Complete the following section to compute the funding priority for the recovery measures in this application (see instructions on page 10).

Priority Ranking Criteria	Yes	No		Ranking Number Plus Modifier
1. Is this an exigency situation?				
2. Is this a site where there is serious, but not immediate threat to human life?				
3. Is this a site where buildings, utilities, or other important infrastructure components are threatened?				
4. Is this site a funding priority established by the NRCS Chief?				
The following are modifiers for the above criteria			Modifier	
a. Will the proposed action or alternatives protect or conserve federally-listed threatened and endangered species or critical habitat?				
b. Will the proposed action or alternatives protect or conserve cultural sites listed on the National Register of Historic Places?				
c. Will the proposed action or alternatives protect or conserve prime or important farmland?				
d. Will the proposed action or alternatives protect or conserve existing wetlands?				
e. Will the proposed action or alternatives maintain or improve current water quality conditions?				
f. Will the proposed action or alternatives protect or conserve unique habitat, including but not limited to, areas inhabited by State-listed species, fish and wildlife management area, or State identified sensitive habitats?				

Enter priority computation in Section 1A, NRCS Entry, Funding priority number.

Remarks:

Section 5A Findings

Finding: Indicate the preferred alternative from Section 2 (Enter to Section 1E):

I have considered the effects of the action and the alternatives on the Environmental Economic, Social; the Special Environmental Concerns; and the extraordinary circumstances (40 CFR 1508.27). I find for the reasons stated below, that the preferred alternative:

- X Has been sufficiently analyzed in the EWP PEIS (reference all that apply)
- Chapter 5.2.2.1.2
- Chapter _____
- Chapter _____
- Chapter _____
- Chapter _____

_____ May require the preparation of an environmental assessment or environmental impact statement.
The action will be referred to the NRCS State Office on this date:

NRCS representative of the DSR team

Title: ~~Stephen Tully~~ *Charles D. Starnes*

Date: ~~10/25/05~~ *11-1-05*

Section 5B Comments: *Disposal site will be determined in cooperation with sponsor prior to bid letting.*

Section 5C

Sponsor Concurrence: _____

Sponsor Representative

Title: *Michael L. Wittke*

Date: *11/01/05*

Section 6 Attachments:

- A. Location Map
- B. Site Plan or Sketches
- C. Other (explain)

- North of Orchard work must be done from the east side.
- South of Orchard work can be done from either side.
- all locations will be re-stored, as near as possible, to pre-storm conditions.

INSTRUCTIONS FOR COMPLETING THE NRCS-PDM-20, DSR

	Explanation of Requested Item	Who Completes
Section 1	Enter Site Sponsor, Location, Evaluation, Selected Alternative, and Reviewed and Approval Signatures.	NRCS completes with voluntary assistance from Sponsor except for NRCS only portion of Section 1A.
1A	Enter the Date, DSR Number, Project Number. For NRCS only enter Eligible Yes/No, Approved Yes/No, Funding Priority Number, and Limited Resource Area Yes/No.	
1B	Enter Sponsor Name, Address, Telephone, Fax	
1C	Enter site location County, State, Congressional District, Latitude, Longitude, Section, Township, Range, UTM Coordinates, Drainage Name, Reach within drainage, and Damage Description.	
1D	Enter Yes/No and any Remarks for the Site Evaluation information. Any No response means the site is not eligible for EWP assistance and no further information is necessary to complete the DSR. (See NEWPPM 390-502.03 and 390-502-04) Enter Yes/No regarding whether the affected public has been informed of the EWP program.	
1E	Enter the proposed treatment and the cost of installation.	NRCS only.
1F	NRCS Review and Approval.	

	Explanation of Requested Item	Who Completes
Section 2	Use available natural resource, economic, and social, information, including the EWP Programmatic Environmental Impact Statement (PEIS), to <u>briefly</u> describe the effects of the alternatives to the proposed action including the “no action” alternative. Typically, the proposed action and no action are the alternatives considered for EWP recovery measures due to the focus on repairing or preventing damages within a watershed. However, in cases where additional alternatives are considered, include all pertinent information to adequately address the additional alternatives (e.g., proposed action would be bio-engineering for bank stabilization, no action alternative, and an additional alternative may be riprap for bank stabilization). Do not leave blanks where a consideration is not applicable, use NA to indicate the factor was considered but not applicable for the alternative.	NRCS completes with voluntary assistance from Sponsor.
2A	List all resource concerns which are relevant to the area of the proposed action and alternatives. Refer to National Bulletin 450-5-8 TCH-COMPLETING AND FILING MEASUREMENT UNITS FOR RESOURCE CONCERNS IN THE FIELD OFFICE TECHNICAL GUIDE (FOTG). Note: the affected area may extend beyond the construction foot print (ex. where water quality or water rights are affected downstream of the site).	
2B	Provide a brief description of the present condition of each resource concern listed in 2A. Quantify conditions where possible. Reference accompanying photo documentation.	
2C	Briefly summarize the practice/system of practices being proposed, as well as the “no action” alternative, and any other alternatives being considered. The “no action” alternative is the predicted future condition if no action is taken.	
2D	Document the efforts of the proposed action and alternatives for the considerations listed in 2A. Reference applicable quality criteria, information in the CPPE, and quantify effects whenever possible. Consider both long-term and short-term effects. Consider any effects which may be individually minor but cumulatively significant at a larger scale or over an extended time period. Clearly define the differences between proposed action, no action, and the other alternatives.	

2E	Enter Special Environmental Concerns for Clean Water Act Waters of the U.S., Coastal Zone Management Areas, Coral Reefs, Cultural Resources, Endangered and Threatened Species, Environmental Justice, Essential Fish Habitat, Fish and Wildlife Coordination, Floodplain Management, Invasive Species, Migratory Birds, Natural Areas, Prime and Unique Farmlands, Riparian Areas, Scenic Beauty, Wetlands, and Wild and Scenic Rivers for each alternative considered. In the case where the selected alternative from Section 5A impacts a Special Environmental Concern, additional information, coordination, permitting or mitigation may be required and adequate documentation should be prepared and attached to the DSR to identify how NRCS or the Sponsor addressed the concern	
2F	Identify Property Protected both private and public, business losses and other economic impacts considered for each alternative. Enter the dollar value of the potential future damages if no action is taken in the Future Damage (5) column. This would be the estimate of the value lost if the EWP recovery measure is not installed. Use the repair cost or damage dollar method to determine the estimate of future damages. The repair cost method uses the costs to return the impaired property, good, or services based on their original pre-event condition or value. The damage dollar method uses an estimate of the future damage to value (e.g. if the structure is condemned, then enter the value of the structure). Enter the estimated amount based upon existing information or information furnished by the sponsor, contractors or others with specific knowledge for recovery from natural disasters for each alternative considered. Often market values for properties or services can be obtained from personnel at the local county/parish tax assessment office. The DSI team needs to determine the Damage Factor (%) which is a coefficient that indicates the degree of damage reduction to a property that is attributed to the effect of the proposed EWP recovery measures. Use an appropriate estimate of how much of the damage the EWP recovery measure will avoid for the alternative being considered. If the recovery measures from a single site will prevent 100 percent of the damage use 100 percent. The Near Term Damage Reduction is the Future Damage (\$) times the Damage Factor (%). Sum the Near Term Damage Reduction values to calculate the Total Near Term Damage Reduction. Enter the Net Benefit which is computed by subtracting the Cost from section 3 from the total near term damage reduction. The economic section must be completed for each alternative considered. Attach additional sheets as necessary.	
2G	Enter information to describe the potential social impacts and considerations for each alternative. Answer Yes or No and any remarks necessary to adequately address each question. The information may be obtained through interviews with community leaders, government officials or sponsors. Factors such as road closures, loss of water, electricity, access to emergency services are used when answering whether the community as a whole has been impaired. This information is part of the environmental evaluation portion of the DSR but may be pertinent in Section 4 regarding priorities. The Social Considerations Section must be completed for each alternative considered. Attach additional sheets as necessary.	
2H	Enter the Group Representation Information for the preferred alternative. Use the most recent census tract information based upon where the EWP recovery measures are located.	Sponsor completes.

2I	Enter whether easement, permissions, or permits, and mitigation will require consultation or coordination for the selected alternative (e.g., Clean Water Act section 404 permit, Endangered Species Act section 10 permits, and any State or county permits or requirements). Describe mitigation to be applied that will offset any adverse impacts and attach any documentation from other agencies regarding mitigation requirements.	NRCS completes with voluntary assistance from Sponsor.
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	Explanation of Requested Item	Who Completes
Section 3	Enter Proposed Recovery Measure(s) including Quantity, Units, Unit Cost, and Total Amount Cost. Enter sum of all Proposed Recovery Measure Costs to calculate Total Costs. Enter Total Installation Costs in Section 1F. The Engineering Cost Estimate must be completed for each alternative considered. Attach additional sheets as necessary.	NRCS completes with voluntary assistance from Sponsor.

	Explanation of Requested Item	Who Completes
Section 4	This section is used to determine the Funding Priority for the preferred alternative and sequence for initiating recovery measures. Enter Yes/No for questions 1 through 4 and enter the number (exigency 1, serious threat to human life 2, etc.) in the right column, Ranking Number Plus Modifier. Complete the Modifier portion by placing the alphabetic indicator a. through f. in the Modifier column. Complete the Ranking Number Plus Modifier column by entering the alphabetic indicator(s) that exists within the site. The number of the site designates the priority (e.g., a site with a designation of 2 is a higher priority than a site with a designation of 3). The modifiers increase the priority for the same numeric site (e.g., a site with a designation of 1a, would be a higher priority than a site with a designation of 1, a site with a designation of 2bc would be a higher priority than a site designated as 2b). Enter the Funding Priority in Section 1A.	NRCS completes with voluntary assistance from Sponsor.

	Explanation of Requested Item	Who Completes
Section 5	Enter the Findings, Rationale Supporting Findings, NRCS Representative signature and Comments, and Concurrence signature by the Sponsor(s).	NRCS completes.
5A	Indicate the preferred alternative and check the applicable finding being made. The NRCS Representative signs indicating the Finding selected. If the proposed action was adequately addressed in the PEIS, check all appropriate chapter paragraphs.	
5B	Enter any additional Comments.	
5C	Sponsor(s) review and concurrence.	Sponsor(s) signature.

Section 6	Include attachments for location map, site sketch or plan and other information as needed.	NRCS completes with voluntary assistance from Sponsor.
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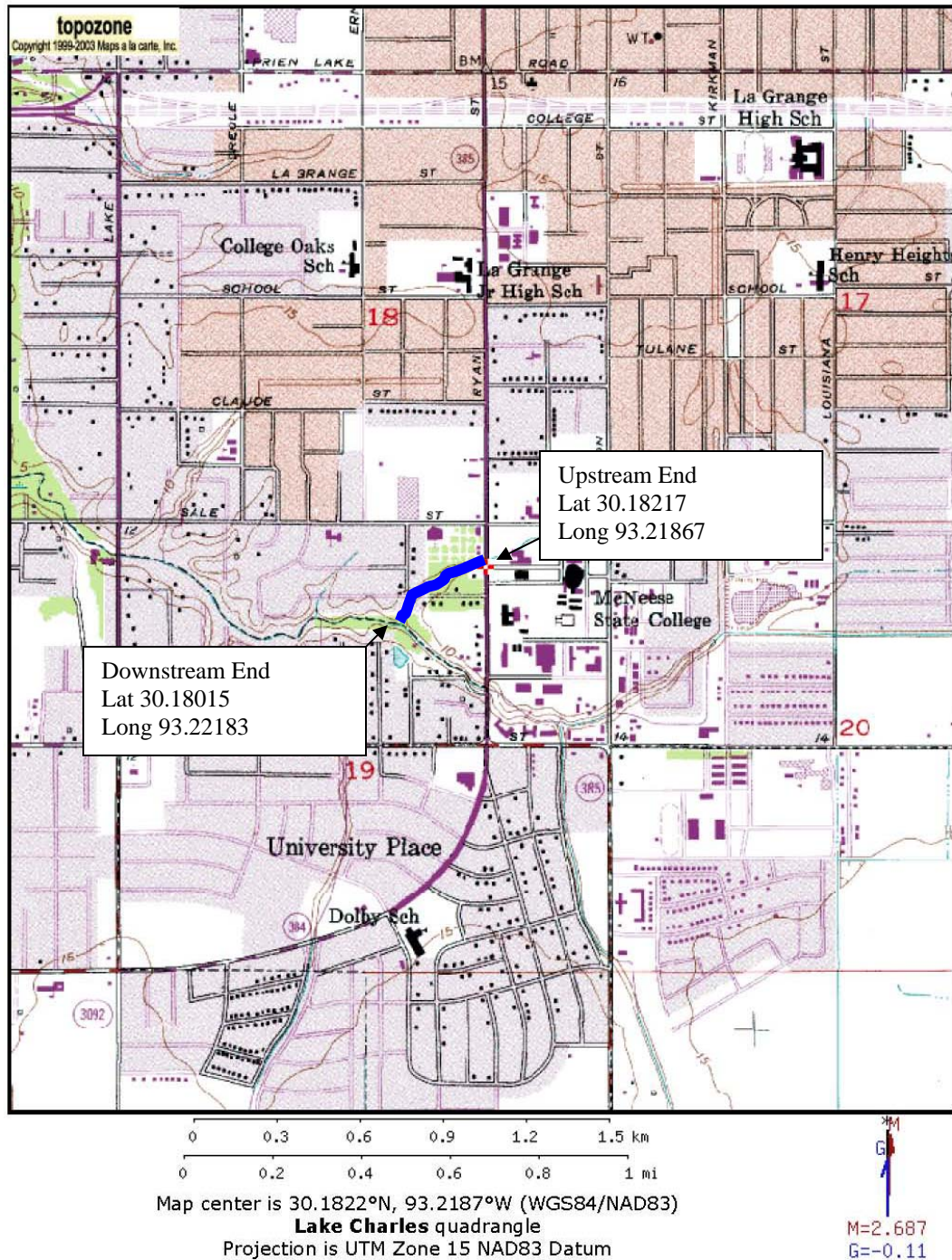
SECTION 6

ATTACHMENTS

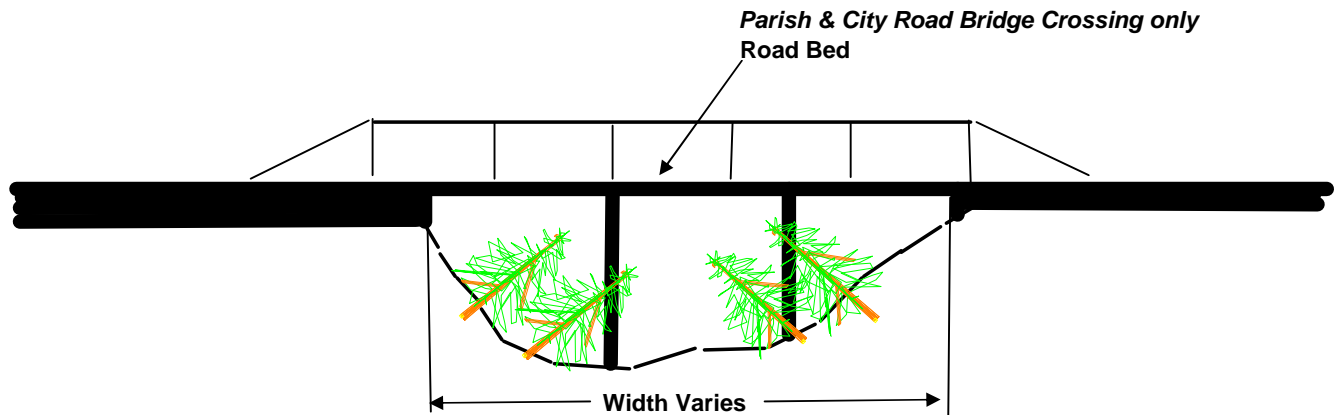
SITE MAP
DSR 019-05-017R
Channel 1-13 from Ryan Street to W-20
Calcasieu Parish
Estimated Reach Length 1,500 LF



TOPO MAP
DSR 019-05-017R
Channel 1-13 from Ryan Street to W-20
Calcasieu Parish
Estimated Reach Length 1,500 LF



Debris Removal



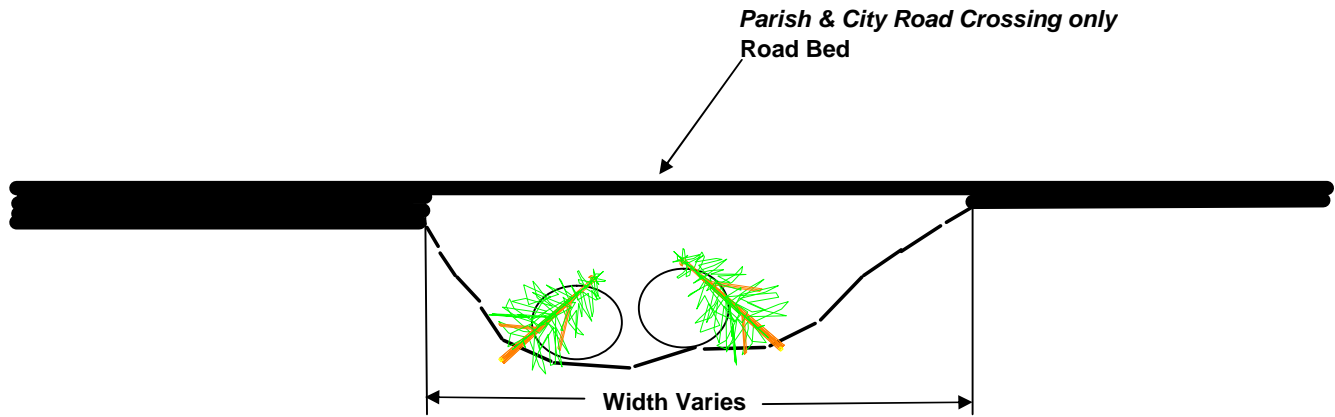
Note: Contract is to remove Debris from upstream and downstream Bridge which includes underside of bridge

Exception: All Crossing which cross State or Federal highways are not included in contract

Typical Road Bridge Crossing Not to Scale

Notice:
48 Hours Before Digging
Call 1-800-272-3020

Debris Removal



Note: Contract is to remove Debris from upstream and downstream Culverts which includes inside of culverts

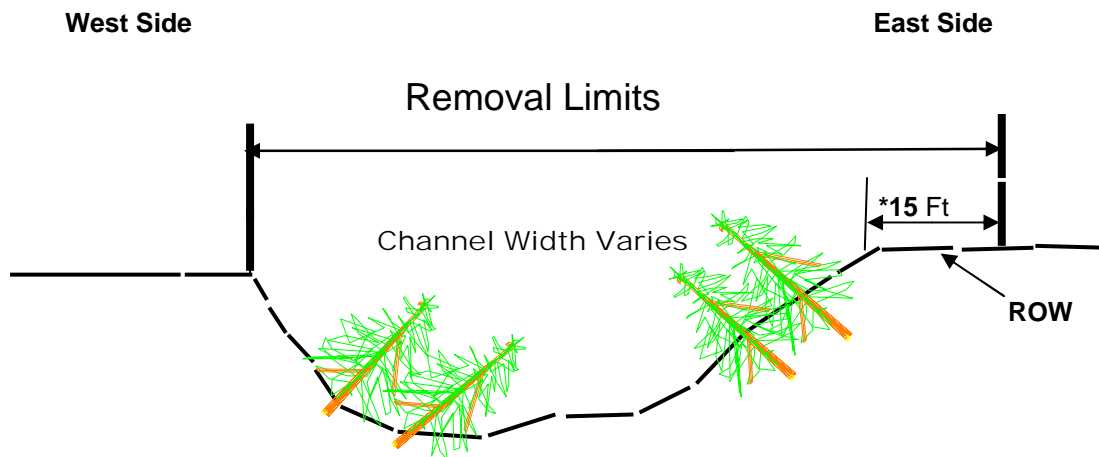
Exception: All Crossing which cross State or Federal highways are not included in contract

Typical Road Culvert type Crossing Not to Scale

Notice:
48 Hours Before Digging
Call 1-800-272-3020

DSR No:019-05-017R
Channel: L-13 from Ryan Street to W-20
PARISH/SPONSOR: Gravity Drainage District #4

Debris Removal
Typical Section North of Orchard Street



Typical Section Not to Scale

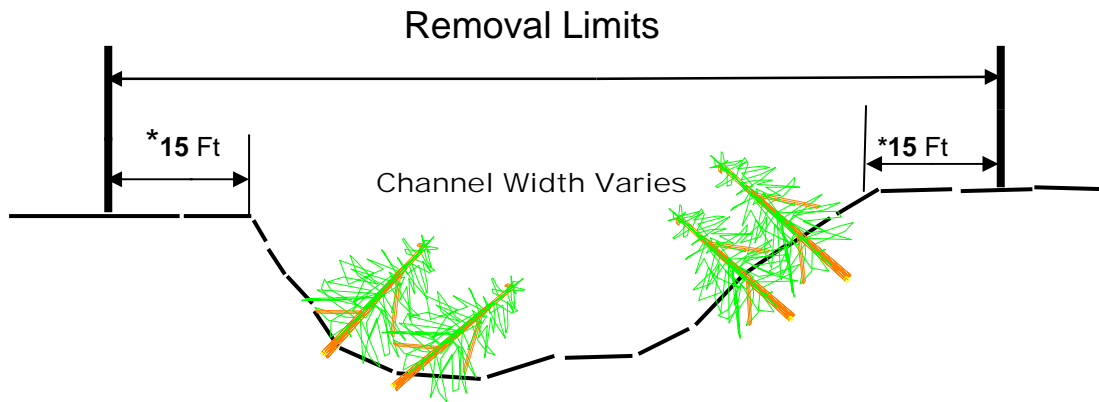
Notice:
48 Hours Before Digging
Call 1-800-272-3020

***Note:** Right of way on east side only north of Orchard Street

Exception it may be possible that trees which were located outside of the the right of way may have fallen into the right of way, these trees will be removed which may be located outside of the work limits.

DSR No:019-05-017R
Channel: L-13 from Ryan Street to W-20
PARISH/SPONSOR: Gravity Drainage District #4

Debris Removal
Typical Section South of Orchard Street



Typical Section Not to Scale

Notice:
48 Hours Before Digging
Call 1-800-272-3020

***Note:** Rights of way on both sides south of Orchard Street

Exception it may be possible that trees which were located outside of the the right of way may have fallen into the right of way, these trees will be removed which may be located outside of the work limits.

DSR No: 019-05-017R

Selected Alternative

Calcasieu Parish
Channel L-13, From Ryan Street to
confluence with W-20 at 200'
North of Monticello Street

Section 5 Engineering Cost Estimate Worksheet

Completed By: Daniel D. Claussen

Date: 25-Oct-05

Type of Work:

Debris Removal

Location of Work:

Township(s)

10S

Range(s)

8W

Section(s)

19

Quadrangle(s)

Lake Charles

Downstream Start:

Ryan St		W-20 Confluence			
Latitude	Longitude	Latitude	Longitude	Latitude	Longitude
30.18217	93.21867	30.18015	93.22183		

Estimated Length of Work Segment (ft):

1,500

Item No.	Proposed Recovery Measure	Quantity	Units	Unit Cost	Amount
1	Mobilization & Demobilization	1	LS	\$4,000.00	\$4,000
2	Channel Obstruction Removal	1,500	LF	\$19.75	\$29,625
3	Seeding, Sprigging and Mulching	1	AC	\$200.00	\$200
4					\$0
5					\$0

Note: Estimated cost of debris removal includes labor and hauling of material to landfill.

Total Estimated Construction Cost

\$33,825

Performance Time:

Production Rate

750 Ft/Day

Segment Length

1,500 Ft

Production Time

2.00 Days

Contract Time

2

Days

Estimated Cost of Equipment with Labor

(Per Mike Kennedy's Email 09/22/04)

Description of Work: Medium

Cost per LF
\$19.75

Estimated Cost of Seeding with Labor

Segment Length

1,500 Ft.

Segment Width

15 Ft.

No. of Segment

2

Acres

1

Cost per Ac

\$200

Total Cost

\$200

Comments:

Selected Alternative involves both sides of channel and 15 ft. of top bank and removing only debris obstructing channel section, NOT floodplains. Measured 15' from Centerline to either side. All removed material will be hauled away. Heavy residential area allows for easy access of channel, Care must be maintained to mitigate any surrounding damage to residential area. Alternative method involves use of air assets, chipping or leaving logs in floodplain not permitted.

Channel Obstruction Evaluation

SITE INFORMATION			
Parish: <u>Calcasieu</u>	Site: <u>Orchard Drive</u>		
City: <u>Lake Charles</u>			
Sponsor: <u>COO 4 W3</u>	Reach:	From - <u>Ryan Street</u>	
Date: <u>25 Oct 05</u>		To - <u>W-20 Con Phase</u>	
Evaluation Team: <u>CLAUSSEN, & Tulley</u>			

PHOTO NUMBERS AND BRIEF DESCRIPTION		WAYPOINTS	
		(CIRCLE location and record in Decimal Degrees)	
Photo #	Description	Start Work (D/S end)	N <u>30.18015</u>
	<u>See Attachment</u>	Midstream	
		End Work (U/S end)	W <u>93.22187</u>

NEARBY AND UPSTREAM STRUCTURES			
(Fill in Numbers, Values, and Size)			
CHURCHES		SCHOOLS	
No. of Churches	<u>0</u>	No. of Schools	<u>0</u>
HOMESITES		BUSINESSES	
No. of Homesites	<u>256</u>	No. of Businesses	<u>0</u>
Average Value of Homes (X \$1,000)	<u>200,000</u>	Size of Businesses	S M L

STREAM CROSSINGS		
(CIRCLE type and write material, size and length)		
TYPE	MATERIAL	NUMBER, SIZE, & LENGTH
Bridge	<u>Concrete</u>	<u>1 - 100' x 40' - concrete</u>
Culverts	<u>Concrete</u>	<u>2 - 6' - 40'</u>
Other or None		

UTILITIES			
(CHECK the location of the utilities in the area and CIRCLE stream orientation)			
	Overhead (Power, Cable, etc.)	U/S	D/S
	Buried (Gas, Sewer, water, etc.)	U/S	D/S
	Elevated Cross channel (Water, Gas, etc.)	U/S	D/S
Remarks: <u>NOW SEEN</u>			

CHANNEL CHARACTERISTICS				FLOW	
(CHECK appropriate box for slope and fill in dimensions information)					
SLOPES		DIMENSIONS		Is Water Flowing?	
<u>X</u>	1.5 : 1 or steeper	Top Width (ft.)	<u>30</u>	<u>YES</u>	NO
	1.5 : 1 through 3 : 1 Slope	Bottom Width (ft.)	<u>10</u>	Is debris accumulating? (i.e. Leaves, Trash)	
	Flatter than 3 : 1	Depth (ft.)	<u>5</u>	<u>YES</u>	NO

STATEMENT OF PROBLEM							
(CHECK the boxes as needed, and CIRCLE the size of debris that applies)							
DEBRIS	IN CHANNEL	ACROSS CHANNEL	SIZE OF DEBRIS			BLOCKAGE	
						% of X-Section Obstructed:	
Pine Trees	<u>X</u>	<u>X</u>	Light	<u>Moderate</u>	Heavy	Less than 25%	26%-50%
Hardwoods	<u>X</u>	<u>X</u>		<u>51%-75%</u>		76%-100%	
Shrubs	<u>X</u>	<u>X</u>					
Other (explain)							

WORK METHOD AND LOCATION	
(CHECK the box that best applies)	
	Within Channel Floating Equipment (i.e. Barge or Marsh Buggy)
	Within Channel Non - Floating Equipment (Excavator/Track-hoe, Spider, etc)
<u>X</u>	From Top Banks
ACCESS TO SITE	
(Explain access issues and possible difficulties)	
<u>Urban Site, access via streets that parallel channel, all residue hauled away</u>	

Stream Visual Assessment Protocol

Owners name DSR# 019-05-017R Evaluator's name STEVE TULLY Date 10/22/05
 Stream name CANTRA BAND BAYON (L-13/W-20) Waterbody ID number _____
 Reach location RYAN STREET TO CONFLUENCE WITH W-20 DRAINAGE CANAL

Ecoregion _____ Drainage area _____ Gradient _____

Applicable reference site _____

Land use within drainage (%): row crop _____ hayland _____ grazing/pasture _____ forest 203 residential 702

confined animal feeding operations _____ Cons. Reserve _____ industrial 102 Other: _____

Weather conditions-today WARM/CLEAR Past 2-5 days WARM/CLEAR

Active channel width 5' BOTTOM 12' TOP Dominant substrate: boulder _____ gravel _____ sand _____ silt _____ mud X
4' DEEP

Site Diagram



Assessment Scores

	EXISTING	PROPOSED
Channel condition	3	4
Hydrologic alteration	3	4
Riparian zone	5	3
Bank stability	6	6
Water appearance	1	2
Nutrient enrichment	1	1
Barriers to fish movement	2	2
Instream fish cover	2	2

EXISTING

PROPOSED

Pools

1

1

Invertebrate habitat

2

2

Score only if applicable

Canopy cover

Manure presence

Salinity

Riffle embeddedness

Macroinvertebrates
Observed (optional)

Overall score
(Total divided by number scored)

26/10

2.6

EXISTING

<6.0

Poor

6.1-7.4

Fair

7.5-8.9

Good

>9.0

Excellent

22/10

2.7

PROPOSED
ACTION

Suspected causes of observed problems

L-13 IS A MAN MADE DITCH WITH HOMES AND BUSINESS ON BOTH SIDES IN MOST PLACES. HOWEVER THE UPPER END DOES HAVE A RELATIVELY WIDE FOREST BUFFER AND EVEN THE RESIDENTIAL AREAS HAVE A NARROW FOREST BUFFER. THE WATER QUALITY IS VERY BAD WITH A BLACK COLOR IN WATER AND STRONG SMELL OF RAW SEWAGE. FISHERIES AND STREAM VALUES ARE VERY LOW. MANY LARGE TREES ARE BLOCKING THE DITCH ALONG MOST OF THE LENGTH.

Recommendations

REMOVAL OF DEBRIS WILL HAVE MORE IMPACT ON THE REMAINING TREES AND RIPARIAN BUFFER THAN IT WILL ON INSTREAM VALUES. RECOMMEND USING ONE SIDE EXCAVATION AND VARY ACCORDING TO LOCATION OF HOUSES